CLAIMS

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- 1. A method of treating a proliferative disease comprising administering to an individual in need thereof an effective amount of a SIRT1 inhibitor.
- 2. A method according to claim 1 wherein the disease is cancer.
- 3. A method according to claim 2 wherein the cancer is a colorectal carcinoma.
- 4. An in vitro method of inducing apoptosis in a cell comprising administering a SIRT1 inhibitor to said cell.
- 5. A method according to claim 4, wherein the cell lacks at least one of functional p53, Bax and PUMA protein.
- 6. A method according to claim 4 or claim 5 wherein the cell is a tumour cell.
- 7. A method according to any one of claims 1 to 6, wherein the SIRT1 inhibitor is a siRNA, a dsRNA, a nucleic acid encoding such RNA, or a SIRT1 antisense RNA.
- 8. A SIRT1 inhibitor for use in a method of medical treatment.
- 9. A SIRT1 inhibitor for use according to claim 8, wherein said treatment is treatment of a proliferative disease.
- 10. A SIRT1 inhibitor for use according to claim 8 or claim 9 which is a siRNA, a dsRNA, a nucleic acid encoding such RNA or a SIRT1 antisense RNA.
- 11. Use of a SIRT1 inhibitor in the manufacture of a medicament for the treatment of a proliferative disease.
- 12. Use according to claim 11, wherein the proliferative disease is cancer.
- 13. Use according to claim 12, wherein the cancer is a colorectal carcinoma.

- 14. Use according to claim 12, wherein the cancer cells lack at least one of functional p53, Bax and protein.
- 15. Use according to any one of claims 11 to 14, wherein the SIRT1 inhibitor is a siRNA, a dsRNA, a nucleic acid encoding such RNA or a SIRT1 antisense RNA.
- 16. A siRNA which inhibits expression of SIRT1 in a cell.
- 17. A siRNA according to claim 16 which comprises a contiguous sequence of 10-30bp from the sequence of SEQ ID NO:1.
- 18. A siRNA according to claim 17 which is between 19 and 22 bp in length.
- 19. A siRNA according to claim 18 which is 19bp in length.
- 20. A siRNA according to claim 19 which has the siRNA sequence of SEQ ID NOs: 11 and 12.
- 21. A composition comprising a siRNA according to any one of claims 16 to 20 and a pharmaceutically acceptable excipient.
- 22. The method of any one of claims 1 to 6, wherein the SIRT1 inhibitor is a siRNA according to any one of claims 16 to 20.
- 23. The use of any one of claims 11 to 14, wherein the SIRT1 inhibitor is a siRNA according to any one of claims 16 to 20.
- 24. A method of identifying a SIRT1 inhibitor for use in a method according to any one of claims 1 to 7, the method comprising:

administering a candidate compound to cultured tumour cells in vitro; determing whether SIRT expression and/or activity is reduced in said cells; and assaying for apoptosis of said cells.

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- 25. A method according to claim 24, wherein the cells lack at least one of functional p53, Bax and protein.
- 26. A method according to claim 24 or claim 25, further comprising the steps of administering said candidate compound to cultured normal cells in vitro and assaying for apoptosis of said cells.